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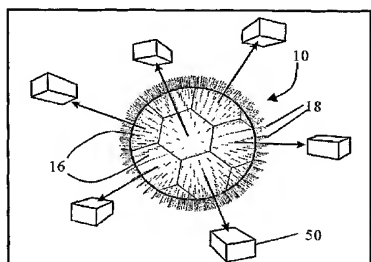
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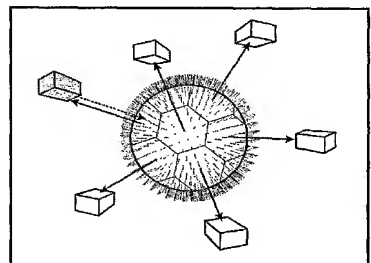
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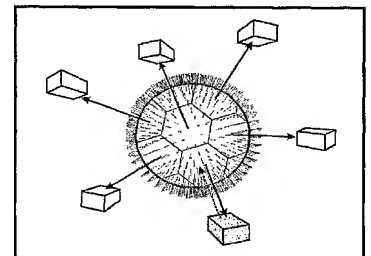
(54) Title: RETROMODULATION-BASED DATA COMMUNICATION



A



B



C

(57) Abstract: A data communication system comprising a transceiver unit for retromodulated optical communication with at least one of a plurality of retromodulator units, the transceiver unit comprising at least one of a plurality of transceivers, the transceivers transmitting diffused radiant energy at different angles covering a predetermined three-dimensional area, wherein each transceiver is enabled to set up and execute communication with at least one retromodulator unit located within its coverage area. Furthermore, a retromodulator comprising multiple arrays of lenslets or spherically arranged lenslets is provided for achieving a wide angle of acceptance. Further more a number of novel applications based on the data communication system are provided, including a remote wireless network connection for a portable computing device, a smart card for remote wireless identification, remote data collection, and remote downloading of digital photographs.

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